Economic Development America COMPETING GLOBALLY * GROWING REGIONAL ECONOMIES * CREATING JOBS

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IN THIS ISSUE

Global Gateways

Features:

- **★** Helping States **Encourage Exporting**
- **★** Building Businesses on the Border
- **★** A Sea Change in Ocean Shipping







U.S. DEPARTMENT OF COMMERCE **Economic Development Administration**

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Economic Development America is a quarterly production brought to you as a benefit of a partnership among the Economic Development Administration (EDA), the International Economic Development Council (IEDC) and the National Association of Regional Councils (NARC). The partnership is designed to provide information about economic development practices and programs to economic development practitioners who serve distressed communities throughout the United States. It also provides six telecasts and a monthly enewsletter, EDA Update. For more information, visit the EDA Web site at www.eda.gov.

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Welcome to the Summer 2006 issue of Economic Development America. The theme of this issue is "global gateways" - multi-jurisdictional regions that collaboratively position themselves to compete in a worldwide economy through the development of seamless access to global markets.

At the dawn of the 21st century, we are truly living in a global economy – or, as New York Times columnist Tom Friedman puts it, the world today is "flat." While in the new flat, global economy, competition may come from any corner of the globe, American firms have a worldwide market of opportunity. The opportunities that global markets offer are significant for America's communities – 95 percent of the world's customers live outside the United States. The global marketplace affords the American consumer choice and cost savings that are unprecedented in any nation's history, and has led to a standard of living that is the envy of the world.

As you will see in this issue, the development of global gateways is a promising strategy for tapping into the opportunities of the worldwide economy, and the Economic Development Administration is committed to supporting such efforts. Some examples in EDA investments in this area include:

The World Trade Center of Greater Philadelphia -Philadelphia, Pennsylvania

EDA invested \$500,000 in 2005 to support the World Trade Center of Greater Philadelphia's "Developing International Trade Opportunities for Industry Clusters" program. The program is providing technical assistance to smaller manufacturers in the Greater Philadelphia area to promote the growth of exporting. The project focuses its assistance on four clusters with global product growth opportunities: evidence-based medicine; business information technology; chemical products; and propellers, propulsion and rotorcraft products. Activities include preparing an area-wide study to identify the trade potential of the four targeted clusters; identifying smaller companies within the industry clusters and assessing their international trade potential; providing smaller businesses with technical assistance services to grow exports and more. The project is expected to increase documented export sales in the region by \$25 million.

Red River Valley Tech Corridor - Grand Forks, North Dakota

In 2004, EDA invested \$2.7 million in the Red River Valley Tech Corridor that extends along North Dakota's Interstate 29 up to Winnipeg in Canada. Three separate investments were made by EDA to help:

• Expand the capabilities of the University of North Dakota's Rural Technology Incubator to provide hightech training programs and facilitate innovation-led economic development;

- Develop the North Dakota State University Research and Technology Park to help create and expand businesses that utilize scientific and technological acumen of the university's faculty and students; and
- Enhance the capabilities of the University of North Dakota Center for Innovation to work with local hightechnology enterprises to become more competitive.

Greater Ouachita Port Commission - West Monroe, Louisiana

In 2003, EDA invested \$1.5 million in the Greater Ouachita Port Commission of West Monroe, Louisiana, to help build an intermodal facility and specialty handling facilities. The investment is working to provide the North Delta Region of Louisiana with access to international maritime trade and commerce.

The investment greatly enhances the productivity of the major employers of Northeast Louisiana, saving them millions of dollars in shipping costs each month. With increased access to international markets, the firms are expanding their operations and providing substantial employment opportunities to this economic region. In addition, the location of the proposed facility on the Ouachita River is providing the region with a competitive advantage that is attracting new firms and diversifying Northeast Louisiana's economy.

These are a few examples of EDA's support for the development of global gateways to help communities and regions compete in the 21st century. Of course, while federal agencies like EDA can help to build the environment for economic growth, successful economic development strategies are locally driven with active participation from the private sector. I thank the contributors to this issue of Economic Development America, which I trust you will find enlightening and informative.

Sincerely,

Sandy K. Baruah

Assistant Secretary of Commerce for Economic Development

Helping States Encourage Exporting

Executive Director, TradeRoots By Renee Carter Export development is often tacked onto the bottom of the economic development task list. The reality, however,

is that international trade is crucial to creating good jobs and local prosperity. If more leaders appreciated the enormous potential of con-

sumers in export markets, particularly for small and medium-sized U.S. businesses, they would pursue trade with a zeal equivalent to that spent in the quest for foreign direct investment.

U.S. companies that export products or services grow faster and fail less often. They also pay their employees an average of 15 percent more than non-exporting companies. Yet economic developers who comprehend this potential to create high-quality jobs and a diverse tax base rarely are able to get the support they need for trade programs.

That's why the U.S. Chamber of Commerce began its TradeRoots trade education and advocacy program seven years ago at the request of its membership, 97 percent of which is small and medium-sized companies (SMEs). TradeRoots works through the U.S. Chamber's vast domestic and global network to educate small and medium-sized businesses on available resources to make exporting a viable growth strategy. The program involves a four-step process:

- · Education (for leadership and businesses),
- Facilitation (supporting SMEs),
- Coalition-building (to increase state capacity for sustained efforts), and
- Advocacy (pro-business trade legislation).

SMEs account for 97 percent of all U.S. exporters, yet they do not produce the majority of exports by value, remaining far below their full export potential. However, they represent a significant, growing share of international commerce transacted in today's highly specialized supplier chains.

Since its creation, TradeRoots has taken its initiatives and programs to 47 states in the U.S. Experience has shown that the quality and structure of trade development programs varies widely and cannot be compared across state lines. Despite differences in local needs, political climates, and available resources, however, several key activities are consistent of successful trade programs.



1. Establish a statewide alliance.

Despite federal and state trade development offices, the trade assistance infrastructure in most states typically is limited, and almost nonexistent in rural areas. Where capacity does exist, contact between trade development organizations might be common, but collaboration frequently assumes no greater form than co-marketing of programs. Too, intense competition for funding and disparate accountability requirements often create more of a truce than true joint efforts. Sometimes the difficulty is as simple as recognizing those with whom they share interest.

A consensus to recognize the state government as the lead organization in creation of a public-private alliance is essential. Nationwide, experience indicates that leadership by a state entity of a small group charged with designing, managing, and implementing a strategic plan produces the best results. The development of a strategic plan is as necessary to a statewide trade promotion alliance as it is to a Fortune 500 corporation.

State leadership can effectively bring key stakeholders together to establish priorities and identify obstacles within the plan. Members of this core group should be representa-

tive of political interests (i.e., governor and legislature), trade development groups, chambers of commerce, select CEOs and entrepreneurs, higher education advocates, and a respected national organization participant. Successful initiatives take this strategic plan to a larger alliance of all interested parties and give the alliance an identity, a communications plan and assigned responsibilities.

South Carolina is an example of where this approach has worked. The state boasts many international advantages: a top-ranked, international business school; a sophisticated and busy port; and its experience as the first state ever to go overseas to recruit foreign investment. Today, South Carolina is home to 400 foreignowned subsidiaries and has one of the nation's highest percentages of workers who receive pay from foreign companies.

Like most states, however, South Carolina initially faced a loosely tethered consortium of trade development entities that frequently duplicated efforts, thereby wasting limited resources. When TradeRoots proposed an eight-state joint program for export development with the U.S. Department of Commerce, South Carolina's wealth of trade promoters (combined with heavy job loss in the textile industry) made its inclusion a natural choice. TradeRoots brought trade-focused individuals from varied organizations together in several strategic planning meetings to establish a tangible strategic framework.

Institutionalizing the practice of collaboration, which requires joint tasks, creates an environment in which participants get to know one another and build trust. Trust is the mortar that either holds the alliance together or crumbles to its destruction. In South Carolina, fortunately, that trust led to creation of the Export South Carolina program (which has since been renamed the South Carolina International Trade Coalition). The Coalition now meets quarterly, holds monthly teleconferences, co-plans calendars and events, and coordinates detailed outreach plans for clients, publicity and elected officials. They have successfully established responsibilities for each member that avoid ego and territory disputes. Furthermore, the strategic plan has permitted certain members to address politically sensitive issues via a partner better positioned to deliver that message.

2. Build political and leadership support.

State leaders and members of Congress often are poorly informed about the positive net impact of trade development on their communities. In contrast, they often have a negative perception of free trade due to the tangible, immediate effects of job losses.

State trade development offices often possess a high public profile and good access to leadership, but suffer from serious constraints within the state bureaucracy. Rather than being allowed to pursue export development work, they frequently get mired in the tasks of investment recruitment, except during high-profile international trade events. And



Trade experts share their knowledge at a TradeRoots Best Practices Summit in Coral Gables, Florida, in January 2006.

because of the time lapse – often several years – between trade offices' efforts and successful outcomes, or the difficulty ascribing success to those efforts, state trade development offices frequently face tougher budget battles.

For economic developers to succeed, policymakers must stop compartmentalizing other investment efforts from those of local trade development. It is no surprise, then, that much of a state's international reputation and trade success depends on the governor playing a leadership role.

The state of Alabama, for example, historically offered little in the way of trade development services. (In fact, the current 2005-06 budget of \$300,000 is the highest ever.) Although many service providers existed around the state and worked in a somewhat collaborative manner, their varied missions, geographic areas and capabilities caused them to move along separate paths. This dilution isolated them and made them invisible to state leadership. It took winning the Mercedes deal eleven years ago to capture leadership's attention to trade.

TradeRoots worked to cement the state's loose network of trade and economic development groups into a concrete structure that commanded high visibility and ultimately led to the endorsement of the governor. With a governor's program to bind the alliance (Export Alabama), the group developed greater penetration into smaller communities and inspired pride in being part of a group with substantive successes. Since then, the state has moved to a whole new level of trade activity. In the past year alone, Alabama exports rose from \$8.3 billion to \$9 billion, an 8.4 percent increase that created an estimated 13,000 additional jobs. As you can imagine, those numbers spurred even greater leadership support and are the likely reason for the state's highest international trade budget to date.

The old idea of "trade development" that considered only manufacturing and agriculture must be expanded to include today's highly promising opportunities in services, high technology and specialized knowledge.

3. Engage in trade education.

Trade education has two primary audiences: leadership and small businesses. Education for the leadership audience – elected and private sector – should focus on explaining the value of trade and U.S. policy issues to their communities. Programs should include information about an area's export statistics, the benefits of exporting to local workers, lists of local exporters, and resources to help local business succeed internationally.

Trade education for small businesses requires outreach that allows those businesses to ask face-to-face questions of credible and knowledgeable local experts who can answer the "whys" and "hows" of expanding internationally. Small firms need help to understand their growth potential in foreign markets and the basics of how to explore and enter those markets.

The benefits of educational programs can be increased by establishing them as part of a high-profile series that puts trade on the media and political priority lists. In Texas, for instance, Governor Rick Perry's participation in the Texas Small Business Summits bestowed enormous attention and prestige on the educational events. The series of summits, held around the state, consisted of a full day of discussion and education on a variety of common concerns to small businesses, including financing, workforce, taxes and business development. Governor Perry personally gave the keynote speeches.

Lessons learned

Our grassroots work across the country has led to a handful of lessons learned. These include:

- If an event does not have a direct application to local businesses, they will not attend. Be prepared for low turnout in some areas, but take quality over quantity at all times. After all, a small group is easier for follow-up!
- Always use a local partner, as it is often difficult for the state to market to the local community. An equally important payoff is the chance to educate a local entity to become an active trade advocate.

- · Assess other activities in the area to avoid market saturation. For most areas in need of economic development, a limited number of potential exporters exists.
- Use both "outside" and local speakers. Outside experts impress in communicating the big messages but the local success stories make international opportunities real and credible to other local companies.
- Always invite the press, always! Have a local success story readily available for the press to profile.
- Always invite the local member of Congress and legislative representatives and put them on the agenda if they attend. Elected leaders gain new perspectives from one another and become more engaged if they know others are heeding their input.
- Encourage leadership to help motivate interest in trade. West Virginia's governor, for example, strongly believes in trade. The state now provides incentives, such as covering 50 percent (up to \$2,500) of the cost for a small business's participation in a first-time trade mission, at times also covering matchmaking and interpretation services.

The existence of a self-sustaining, statewide network of trade development professionals is essential to helping SMEs increase their market share abroad, thereby improving local economies at home. The old idea of "trade development" that considered only manufacturing and agriculture must be expanded to include today's highly promising opportunities in services, high technology and specialized knowledge. Developing these possibilities depends on long-term relationships, expert marketing efforts and joint ventures more than ever before. $\star \star \star$

Building Businesses on the Border:

The Bi-National Sustainability Laboratory As an Engine of Economic Change

By Michael Acosta

Associate Director, Institute for Policy and Economic Development, University of Texas-El Paso

Imagine the U.S.-Mexican border as the home to advanced, emerging technology businesses with an entrepreneurial spirit akin to Silicon Valley or the Boston Corridor – but with a spicy international flavor and attitude.

These cutting-edge, bi-national enterprises would span the entire length of the border's 2,000 miles from the Gulf Coast cities of Matamoros/Brownsville to the Pacific Coast cities of Tijuana/San Diego. It would be anchored in the center by advanced aerospace and automotive industrial activities in the Paso del Norte region of West Texas, Southern New Mexico and Northern Chihuahua, with growing nodes of wealth-generating enterprises in such cities as Laredo, Nogales, Mexicali and El Paso.

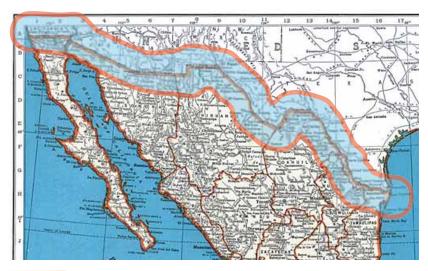
The intellectual capital generating and supporting these technology enterprises would flow from the regional universities and national research laboratories and centers, working in strategic partnership with the private sector and supported by public policy and programs at the federal, state and local levels.

This is the vision that drives the newly created Bi-National Sustainability Laboratory (BNSL) based in Santa Teresa, New Mexico.

Early history

The BNSL was at least five years in the making. In the late 1990s, New Mexico's Sandia National Laboratory was exploring the concept of applying advanced technologies to economic development, with the goal of reducing political tensions at borders caused by economic disparities. Initial ideas focused on the Middle East, but they quickly determined that the U.S.-Mexico border would be a better focus for their

They found strong support for the BNSL concept with the U.S.-Mexico Foundation for Science (FUMEC), a binational organization founded in 1992 by U.S. Congressman George E. Brown. Headquartered in Mexico City with an



The BNSL project spans the entire 2,000 miles of the U.S.-Mexico border, from the Gulf Coast cities of Matamoros/Brownsville to the Pacific Coast cities of Tijuana/San Diego.

office in Washington, D.C., and a border office at the University of Texas at El Paso, FUMEC's primary purpose is to promote and support scientific and technological collaboration between Mexico and the United States.

FUMEC had pursued a similar strategy with another binational program, the Materials Corridor Initiative. That initiative focused more narrowly on advanced materials and materials processes for potential economic development opportunities. The five-year, multi-million-dollar program identified 12 deployable materials technologies, two of which actually became start-up companies in the border region at the end of the initiative.

Based on that earlier success, and given FUMEC's overall mandate to act as a bi-national science and technology catalyst, Sandia and FUMEC worked energetically to obtain support and funding from both federal governments. In October 2004, they secured a two-year grant for \$400,000 from the U.S. Economic Development Administration and a matching commitment from Mexico's Consejo Nacional de Ciencias y Tecnología (CONACYT), Mexico's equivalent to the National Science Foundation.

FUMEC worked closely with Sandia and border state academic institutions (Texas A&M, the University of Texas at El Paso, Universidad Autónoma de Ciudad Juarez, and others) in obtaining support for the BNSL. They also worked closely with the Border Governors Conference, led in 2004 by Governor Bill Richardson of New Mexico and subsequently by Governor Martin of Coahuila, Mexico. Today, the list of BNSL's strategic stakeholders also includes New Mexico's Economic Development Department, New Mexico State University, New Mexico Tech, Monterrey Tech (Juarez), Delphi Corporation (Juarez), Team Technology, Verde Realty, the national Advanced Materials Research Center (CIMAV) of Chihuahua, New Mexico's TVI Community College, El Paso Community College and others.

In September 2005, the BNSL formally opened its doors at a 4,600-square foot facility in Santa Teresa, to begin fulfilling the hopes and vision of its creators.

BNSL vision and structure

The BNSL, a non-profit corporation, sees itself as an engine of research excellence for sustained economic development on the U.S.-Mexico border. Its mantra is "building border businesses." The BNSL's goal is to create bi-national, publicprivate partnerships for economic development in the entire U.S.-Mexico border region, from the Gulf of Mexico to the Pacific Ocean. These partnerships will combine the "triple helix" of business, academia and government to work collaboratively in achieving the overall vision of the BNSL.

The BNSL envisions using distributed facilities and activities appropriate to the strengths and opportunities of specific border regions. While initially focusing its attention on the Paso del Norte (central border region), the BNSL expects to expand rapidly by creating centers of focus, or nodes, in other regions of the border as opportunities and resources permit. While the facilities and activities are expected to be dispersed, the various programs and projects will be coordinated and managed through a central leadership under a single Executive Director and a bi-national board of directors.

How does it differ?

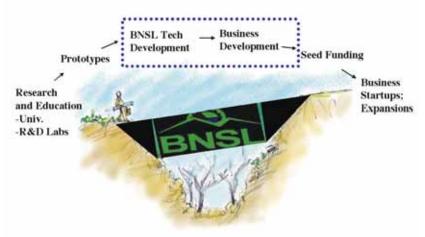
The BNSL differs from existing approaches by focusing binational, public-private resources on business formation and expansion, using applied technology research and a proactive commercialization process. The closest comparison would be to global corporate laboratories, which - while having many technical and business assets and strengths – lack the BNSL's ability to partner widely.

The BNSL's approach goes beyond typical business development and incubator initiatives by focusing on the aspects of technology commercialization typically characterized as the "valley of death" - the place between technology prototype and commercial product. Its staff and partners will provide expertise in technology development, product realization, business planning and project financing. This approach will not only increase the number of successful transitions from prototype to company but also address the problem of new concepts whose developers lack the skill, or will, to commercialize the products themselves. The BNSL will link the diverse cultures of academia and the business and financial world, looking for market "pull" in lieu of technology "push."

The BNSL's bi-national synergy is further emphasized by the strength and breadth of its board, which consists of 14 high-level business leaders (CEOs, vice presidents, directors, etc.), academic professionals and governmental officials from both sides of the border and representing the diverse geographic regions of the 10 border states.

Strategies for economic development include applied research, technology/product development, advanced training, business planning, mentoring, incubation, business and technology acceleration and marketing, among others. The Santa Teresa facility has some 1,600 square feet of office and lab space and 3,000 square feet of high-bay light industrial space. The flexible facility can accelerate or incubate between seven to 10 companies or start-ups.

Bridging the "Valley of Death"



The BNSL's approach focuses on the aspects of technology commercialization typically characterized as the "valley of death" - the place between technology prototype and commercial product.



The BNSL envisions using distributed facilities and activities appropriate to the strengths and opportunities of specific border regions.

Program and project examples

The BNSL has identified some two dozen programs and projects that may form the basis of its initial activities. Several of those programs and projects include:

• MEMS (Micro Electro-Mechanical Systems) Packaging Cluster. MEMS represents a major emerging technology with direct applications in the automotive, aerospace, defense, homeland/border security, health and communications fields, among others. Because of the extreme environments in which these fragile systems are expected to work, packaging technologies are critical in the adaptation of these devices.

The Paso del Norte (PDN) MEMS Packaging Cluster was established in February 2004 and currently includes FUMEC and BNSL; universities and community colleges, including the University of Texas at El Paso (UTEP), New Mexico State University (NMSU), Universidad Autónoma de Ciudad Juarez (UACJ), New Mexico Tech (NMT), El Paso Community College (EPCC), TVI Community College, and Tecnológico de Monterrey - Juarez Campus; government research laboratories (Sandia National Laboratories and CIMAV -Centro de Investigación de Materiales Avanzados); and industry (Delphi Corporation, Team Technology).

The long-term intent of the cluster is to establish core competencies among the members in the area of MEMS packaging that will lead to research, innovations, product developments, technology commercialization and economic development. Currently, the MEMS cluster is drafting a funding proposal to submit to the National Science Foundation for the development of the cluster and associated projects.

The cluster will use the BNSL's MEMS packaging technical support facility being created at Santa Teresa, and its commercialization activities will be conducted in conjunction with the BNSL. In addition to laboratory space, the BNSL and its partners will provide a range of specialized services aimed at bridging the gap between concept development and commercial success. New start-up companies are expected to be created and physically located on both sides of the border, with wealth creation and economic benefits to both sides.

• Refinery Sciences, Inc. Refinery Sciences, Inc. is a new start-up based in part on jointly owned UTEP-CIMAV intellectual property created as part of the Materials

Corridor Initiative. This technology focuses on advanced catalysts for converting heavy crude petroleum materials to light petroleum. The catalysts have a major potential use in developing remaining petroleum stocks in the United States, Mexico, other parts of Latin America and the world.

Refinery Sciences, Inc. currently is continuing laboratory research of its catalytic material in partnership with the University of Texas at El Paso. However, in order to go to the next level – creating prototype quantities of the advanced catalysts to be tested in actual petroleum refineries - Refinery Sciences will take advantage of high-bay space at the BNSL and install specialized equipment at the Paso del Norte facility. The BNSL will also work closely with the company to find appropriate partners and opportunities for use of this new advanced material in the U.S. and Mexico, as well as globally.

Materials Corridor Initiative (MCI) projects. As already noted, the Materials Corridor Initiative resulted in more than a dozen projects that were considered as deployable. Two of these projects became new start-up corporations (Mayan Pigments, Inc. and Refinery Science, Inc.) at the end of 2004. The BNSL is analyzing the remaining projects and looking for appropriate private sector partners, particularly in Mexico, to advance some or all of these projects to the start-up stage as rapidly as possible. These projects also have the potential for continued research support from Mexican government research centers to ensure greater connectivity to Mexican private sector interests. If needed, seed funds from the BNSL will be used to help leverage additional support for advancing these projects.

A technology engine on the border

The recent meeting of President Bush, Mexican President Vicente Fox and Canadian Prime Minister Stephen Harper in Cancun underscores the importance of establishing and maintaining strong economic collaborations among the NAFTA partners to fulfill the Security and Prosperity Partnership program for enhanced North American competitiveness. We expect the BNSL to provide a unique and important mechanism for achieving the economic goals of our governments and the aspirations of their citizens in the border region. ★★★

Trade Adjustment Assistance:

Helping Firms Compete in the Global Economy

Director, Southeastern Trade Adjustment Assistance Center By Marla Gorges

Gary Porter characterizes his company, Porter Medical Products, Inc., as a very small firm (seven employees) that competes with very large companies. He started the DeLand, Florida-based firm in 1998 to manufacture an aortic punch, a specialty disposable instrument used in open-heart surgery. "Because I'm a sales and marketing guy, I thought it would be a lot easier than it was," he admits.

He started out marketing the punches successfully throughout the U.S. But as sales grew and the firm ramped up production, product quality began to go down. Porter felt sure that his device was the best on the market, but he realized that keeping the quality consistently high was essential. In addition, he knew that to expand and compete in foreign markets – particularly Canada and Europe – he needed certain quality certifications.

"We needed to become ISO certified and also get a 'CE' mark, a certification that allows us to sell in European markets," says Porter. "It's a very expensive effort; about \$25,000. Being a small company, number one, we didn't have the inhouse expertise to do it, and number two, we didn't have the \$25,000 lying around."

That's when a consultant recommended he seek help from the Southeastern Trade Adjustment Assistance Center (SETAAC), a non-profit organization based at Georgia Tech's Enterprise Innovation Institute. For qualifying companies that are experiencing heightened import pressures, SETAAC provides assistance in manufacturing, sales and marketing, and information systems to make them more competitive.

SETAAC was able to help Porter Medical bring in a consultant, get its quality systems up to date and secure the certifications it needed. "We were able to get initial ISO 13485:2003 certification quickly," says Porter. "From what I understand, that's about the highest quality certification you can get as a medical device manufacturer. I take my copy of my certificate with me to trade shows and display it. If you know manufacturing, you are impressed by this!"

Now, his main problem is filling all the orders he has. During fiscal year 2004-2005, Porter Medical's sales grew about 16-18 percent. Porter budgeted for a 20 percent increase in sales for 2005-2006, and the company is on track to exceed that easily. He also was able to hire additional staff.

Porter estimates that his company has 15-18 percent of its particular market niche. "Our quality systems are probably better than most of our competitors, even though they are multi-billion-dollar companies," says Porter. "[Certification] has enabled us not only to produce a consistent product but has opened up new markets for us. Because I didn't have the in-house resources, there is no way I would have been able to do this without SETAAC."

Top of the line tables

When Rusty Powell started a backyard furniture business with his neighbor in 1978, he didn't envision his line of custom-built table tops in places like the Waldorf Astoria in New York City, the MGM Grand and Caesar's Palace in Las Vegas, and the Holiday Inn in Santiago, Chile.



Harbor Furniture's Rusty Powell, with SETAAC project manager Mark Hannah, shows off a Table Topics model.

SETAAC was able to help Porter Medical bring in a consultant, get its quality systems up to date and secure the certifications it needed.

But these are just a few of the customers who have chosen Harbor Furniture's Table Topics products for their facilities. Table Topics table tops are produced in a wide variety of custom graphic designs and traditionally have been sold through a network of independent, multi-line sales representatives to interior designers, restaurant dealers, chain restaurant buyers and end-user facilities.

Even with a growing awareness of its product, Harbor Furniture has not been immune to the challenges of foreign competition. After more than 25 years in business, the company's 75,000-square-foot Elberta, Alabama-based manufacturing facility and its 45 employees - like most of the hospitality and commercial furniture industries - have been tested by a flood of low-priced case good imports. Along with increasing overseas competition, Powell has the additional challenge of effectively and affordably marketing a product that he says has to "be seen to be believed."

"We have often invited salespeople and customers to tour our plant," says Powell. "Afterward, they say, 'We had no idea what you really did until we got here.' That has been our dilemma. How do we show potential customers what's different about Table Topics?"

For more than two decades, Harbor Furniture relied on costly four-color print catalogs to show its offerings. Once the Internet emerged as a marketing and sales channel, Powell began investigating how he could showcase the company's products online. But he was hesitant to embark on a Web project because of the difficulty of demonstrating the product's creativity and quality.

About that time, Powell received a letter from SETAAC. He set up a meeting and got hands-on help moving the application process forward. With SETAAC's assistance, Harbor Furniture developed an interactive Web site with a "virtual designer" for custom orders (www.table-topics.com). Powell says that while his marketing costs have been significantly reduced, sales have gone up nearly tenfold and Harbor Furniture has hired 25 new employees.

"SETAAC took care of every bit of what we needed, and it all came through with minimal effort and time on my part," he says. "They were there every step of the way." $\star \star \star$

How Trade Adjustment Assistance works

Any manufacturing firm with U.S. headquarters is eligible to be approved for assistance by the Department of Commerce if it can show:

- a 5 percent decline in sales (dollar volume) for a current period (6 to 12 months), versus the same months for the prior year;
- a decline of 5 percent in employment for that same period; and
- · that the decline is import-related.

There are three phases to the assistance process. First, a firm must get certified. Then an Adjustment Plan is developed, which recommends turnaround projects. The final phase is project implementation.

Once a firm is certified, SETAAC visits the company to look at its entire operation, ask questions and listen to management. From that point, the Adjustment Plan (AP) is prepared. The AP costs depend on firm size in sales dollar volume, but range from \$3,000 to \$12,000, with the TAAC picking up 75 percent of the total cost.

Once the AP is approved, the project implementation phase begins. Depending on the firm's sales volume or size, up to \$150,000 in funding is available on a 50/50 cost-share basis for turnaround projects that are outlined in the AP. (A mini-plan option is available in which project funds are capped at \$30,000; SETAAC pays for 75 percent of the total project cost.)

Private consultants perform the adjustment plan project work. The firm has final consultant selection rights and signs all contracts. SETAAC cannot pay for assets, but can pay for things such as equipment training, installation and specialized software modules.

Last year, SETAAC provided technical assistance to more than 30 companies in an eight-state region that were experiencing increased import competition. On average, these companies received \$42,000 in matching funds from the U.S. Department of Commerce to make improvements in production, marketing/sales, and information systems. In the past three years, SETAAC clients have seen sales increase by 26 percent and productivity improve by 28 percent.

There are 11 Trade Adjustment Assistance Centers around the country. Find the one nearest you at http://www.taacenters.org.



World Trade Centers:

Gateways to the Global Marketplace

President, World Trade Centers Association

By Guy Tozzoli Richard Smith III, president and CEO of Rigidized Metals Corporation in Buffalo, was looking for a way to expand

sales of his specialty metal products into South and Central American markets. He made two trips to Mexico without much success.

Then he began working with the staff of World Trade Center Buffalo Niagara (WTCBN), which was able to find a familyowned business in Mexico that turned out to be a perfect partner. Noting that it would have cost him \$50,000 to hire a multilingual industry expert to do this work, Smith called the \$80,000 first order that came out of the partnership a good return on his investment as a member of WTCBN. "WTCBN got to know our stuff, our people – that helps. They're an extension of our sales force," said Smith.

WTCBN is one of 58 World Trade Centers (WTCs) in the United States – and one of 282 worldwide – that provides new and veteran world traders alike with information, facilities and services to succeed in the increasingly competitive global business world. Working under guidelines established by the World Trade Centers Association (WTCA), headquartered in New York, WTCs accomplish their goals in various ways. By providing office space for a wide range of traderelated government and business entities, they create a concentration of international business activity that benefits tenants as well as business visitors. WTCs also organize trade seminars, missions and exhibitions, and provide trade information and market research, club and meeting space, business services and more.

Following are examples of outstanding practices provided by several WTCs in the United States and some of the businesses they have assisted.

Information services: World Trade Center Greater Philadelphia

Global Equipment and Machinery Sales, Inc. (Global), a member of the WTC of Greater Philadelphia, is an international supplier of used processing machinery for the pulp, paper and converting industries. Global buys and sells anything from single machines up to complete operating mills for the production of paper. Its sales force generates \$5-10



Richard "Rick" Smith (left), President of Rigidized Metals Company, got connected with a Mexico-based distributor through World Trade Center Buffalo Niagara.

million of revenue annually, with 60 percent coming from outside the United States.

Since 2002, Global has used many services of the WTC of Greater Philadelphia to get its message out. When its salesmen travel overseas, they frequently call on local WTCs that can help them expedite the sales process. Aided by events like Brazil's annual trade show for the pulp and paper industries - which Global attended with the assistance of the WTC of Greater Philadelphia – the company has greatly expanded its scope, recently leveraging the contacts made at the trade show into a million-dollar equipment sale. In addition, the WTC of Greater Philadelphia represented Global in business meetings with potential customers at the 2005 WTCA meeting in Mumbai, India.

In its three years of operation, the WTC of Greater Philadelphia has hosted more than 100 seminars, conferences and networking programs that attracted about 5,000 participants, making it one of the most productive economic development organizations in the region.

World Trade Centers provide new and veteran world traders alike with information, facilities and services to succeed in the increasingly competitive global business world.

WTCs provide effective information services by:

- · Using the global WTC network to obtain data on market opportunities, prospective trading partners and
- Providing extensive data resources via WTCA OnLine, a Web-based trade information service;
- Knowing their own local market and quickly taking advantage of new issues and programs that affect it;
- Updating their own information resources continually to keep them timely.

Networking: The New Orleans World Trade Center

A number of WTCs operate clubs as a means of helping their members get to know one another better and to develop a client base for other WTC programs.

The club at the New Orleans WTC is the oldest and one of the most prominent. Located on the 30th floor of the WTC building, it offers a panoramic view of the city, the port and the Mississippi River. Known as the Plimsoll Club, it is the region's premier social and business venue. From the beginning, the club's connection to international trade has enabled it to play a central role in New Orleans' business and political life. Unlike other clubs in the city, it hosts ongoing seminars, programs, luncheons and events on international trade and world affairs. Many official functions take place at the club, including receptions for U.S. and foreign dignitaries, giving it a special cachet in the community.

Assisting trade missions:

The South Carolina World Trade Center Charleston

The South Carolina WTC Charleston stands out in the services it provides to inbound selling missions. Imports as a jobs generator is an opportunity that is often overlooked by groups that focus on expanding U.S. exports. In today's global manufacturing environment, both the state's major manufacturers (such as BMW, Michelin, Fuji and Honda) and its smaller companies need to access components from anywhere in the world, and the WTC is the only organization in South Carolina that is geared to help them.

For example, JBE, Inc. of Hartsville provides sub-assembly, warehousing, inventory management and sorting services. The company attended one of the WTC's one-and-a-halfday World Trade Certificate programs that focuses on the nine steps of importing and exporting. Learning of the South Carolina WTC's connection to the global network of trade centers, JBE used the WTC in Mumbai to confirm the legitimacy of a prospective trading partner in India. Later, company officials traveled to India and received assistance from WTC Mumbai with visas and business research. The relationship between JBE and the Indian company is growing and a business venture is imminent.

During 2005, the South Carolina WTC was involved in either developing or assisting a total of 111 projects, including the establishment of 20 new trading companies. The strategies used by South Carolina WTC Charleston and other WTCs to provide services to trade missions include:

- Emphasizing the education of clients to understand all essential aspects of exporting and importing;
- Being available to assist any company, no matter how small, that is interested in entering the international business arena:
- Screening prospective business partners to promote successful meetings;
- · Assigning case managers who follow up regularly with clients to make sure they have all the information and assistance they need;
- Using the WTC global network fully to support local
- · Working closely with state, federal and other organizations where appropriate; and
- Conducting trade missions in conjunction with trade fairs to expand the mission's business opportunities.

The San Diego World Trade Center

A member of the San Diego WTC, Palomar Technologies is the premier supplier of high-precision, microelectronic assembly equipment in the world. "Much of our company's future growth is tied to trade with companies that manufacture in the Pacific Rim," says Palomar president Bruce W. Hueners. "While we import manufactured products from southeast Asia, customers from Singapore to Seoul and from Shanghai to Delhi visit our factory here in San Diego."

The San Diego WTC has helped Palomar Technologies by providing educational programs that address relevant topics, such as its periodic "China Economic Update and Outlook,"

and networking sessions with the WTC's diverse board of directors and members. In addition, a WTC-led trade mission to China's Hi-Tech Trade Fair in Shenzhen resulted in more than \$1 million in sales for his company.

The San Diego WTC's strategies for success focus on:

- Maximizing business opportunities along the Pacific Rim through San Diego WTC's unique Asia Desk, which positions companies for trade with the 24 vibrant markets of Asia;
- Providing export training for foreign-born San Diegans, so they can leverage their foreign language fluency, cross-cultural knowledge and homeland connections to create jobs and competitive advantage for San Diego and regional businesses;
- Leveraging its board and community relationships with academia, trade associations and government to position the region internationally and disseminate timely trade-related information; and

· Meeting the trade education needs of its members and stakeholders by remaining flexible, innovative and strategic.

WTCA support and reciprocity

In close cooperation with its members, the WTCA continually looks for opportunities to create innovative services for traders. In 1985, it was the first organization in the world to offer global e-mail and database services, including a bulletin board of trade opportunities. The WTCA also created TradeCard (www.tradecard.com), a Web-based platform that automates trade transactions from procurement through payment.

Reciprocity and mutual assistance among members are a fundamental part of the WTCA's mission. This means a member of any WTC is automatically a member of every WTC. When a client of the WTC in Denver, for example, is interested in exploring trade opportunities in Taiwan, he or

> she can call on the extensive services of WTC Taipei and receive the same assistance as one of their local clients. With WTCs now in 85 countries, it's a powerful network for servicing WTC clients wherever they may be.

The WTCA also works to improve the quality of services offered by member WTCs by establishing performance standards and a certification system for each essential WTC service. In addition, periodic training programs are offered for WTC staff, and selected senior staff members visit both new and veteran members to offer guidance on all aspects of their operations.

The tragic events of September 11, 2001 took the lives of almost 3,000 people that terrible day. WTC New York, our flagship facility, was destroyed along with the Association's offices on the 77th floor of the north tower. Fortunately, all our staff members survived, although there were some severe injuries and emotional trauma. For all members of the association, the horrible event hardened their commitment to our mission – not only to promote prosperity and economic development, but to continue to build bridges of constructive commerce and peace among peoples everywhere. **



The WTCA represents 248 members in 70 countries, including 65 WTCs in North America. These centers service more than 750,000 international trading corporations.

The U.S. - Mexico Border:

Integrated Economies

Policy Director, The Border Trade Alliance

By Jesse Hereford The southern border of the United States has seen a tremendous boom in economic development activity over the last decade. To gain a full appreciation of that

activity, one must understand the sheer volume of goods and people that enter and exit the United States through the southern border.

In his testimony before the Senate Committee on Foreign Relations in April 2004, Assistant Secretary for Economic and Business Affairs E. Anthony Wayne quoted some startling statistics. According to Wayne, "approximately 60 percent of the 500 million visitors admitted into the United States enter across the U.S.-Mexico border, as do 90 million cars and 4.3 million trucks [annually], all contributing to the \$638 million in trade conducted at our border [with Mexico] every single day."

The passage of NAFTA in 1992 and its implementation in 1994 have accelerated growth in both imports and exports. In 2004, the top five southern ports along the U.S.-Mexico border processed \$182.7 billion in total imports and exports. In 2004, for the third year in a row, the state of Texas ranked as the number one state in terms of export revenues. Texas exports for 2004 totaled \$117.2 billion, an increase of \$18.3 billion from the previous year. With three of the top five ports along the U.S.-Mexico border - Laredo, El Paso and McAllen - located in Texas, it's no wonder the state is ranked so high. In 2004, these ports were ranked as the first, second and fourth most productive land ports on the Southwest border, respectively, with Otay Mesa, Calif., ranked third and Nogales, Ariz., ranked fifth.1

To gain some perspective on the numbers above, the top ports in the U.S. with respect to the value of imports and exports in 2004 were Los Angeles, New York and Detroit, ranked first, second and third, respectively. Would you have guessed that the port of Laredo is fourth on that list? 2

Booming border industries

On the Mexican side of the border, the emergence of manufacturing plants known as maquiladoras - defined as Mexican assembly plants that manufacture finished goods for export to the U.S. - has played a major role in border economies. The word "maquiladora" is derived from the



word "maquila," which in colonial Mexico was the fee that grain mills would charge to process other farmers' grain. The U.S. Government Accountability Office estimates that 26,000 American-based companies supply Mexican maquiladoras with both raw materials and components. It is estimated that over 1 million Mexicans are employed in over 3,000 maquiladoras along the border.3

With the continued expansion of maquiladoras in Mexico, U.S. border cities are taking advantage of their proximity. Maquiladoras are generally found in Mexican border cities where an interstate highway connects on the American side of the border. There is a large maquiladora presence in the Mexican border towns of Tijuana, Ciudad Juarez, Nuevo Laredo and Reynosa. Directly across the border, the U.S. interstate highway system connects these towns respectively to San Diego, California, and El Paso, Laredo and McAllen, Texas. Many of these border cities have become logistical centers to assist in the shipping of these goods.

The transformation of the U.S.-Mexico border into a mega-gateway for global goods has created specific industry clusters along the border, with different cities focusing on

The transformation of the U.S.-Mexico border into a mega-gateway for global goods has created specific industry clusters along the border, with different cities focusing on and specializing in different industries.

and specializing in different industries. Let's take a closer look at some key border industries - manufacturing, warehousing and transportation, and wholesale/retail trade - and where they are booming.

Laredo, Texas

As noted earlier, the port of Laredo is ranked first among ports along the Southwest border and fourth among all U.S. land ports for the value of goods that are shipped through the area. In 2004, \$130.8 billion worth of goods and merchandise passed through the port of Laredo, an increase of 13 percent over the previous year. Over 40 percent of northsouth traffic that crosses our international border with Mexico drives across one of the international bridges in

Laredo's primary industry is transportation and warehousing. In 2003, these industries contributed 16.2 percent of the total earnings of the area.4 Crossing the Rio Grande River into Nuevo Laredo, one finds numerous maquiladoras. The Delphi and Sony manufacturing plants are the top two employers for all the maquiladoras in Nuevo Laredo.

El Paso

El Paso is the largest city along the Texas-Mexico border, and manufacturing is its number one industry in total earnings. El Paso's neighboring city of Juarez, Mexico, has more maquiladoras than any other border city, employing more than 200,000 people.

Otay Mesa and San Diego, California

The Otay Mesa port of entry handles the second largest number of trucks (1.4 million crossings annually) and the third largest dollar value of imports and exports among all U.S.-Mexico land border crossings.⁵ Nearly all of the trade traffic is related to regional manufacturing plants in Mexico and the agriculture industry. However, more than 14 million people also cross into the United States using this port.

In addition to the numerous maquiladoras across the border in Tijuana, the retail industry also has boomed along the California-Mexico border. Close in proximity to Otay Mesa is the San Ysidro international crossing, where the Shops at Las Americas outlet mall is located right on the border. Demonstrating how some border cities rely not just on truck traffic but also on passenger traffic, the project plans to expand with an international pedestrian crossing into the outlet mall.

McAllen, Texas

Retail is a major economic driver in McAllen as well and is the second largest industry after health care. McAllen draws from a consumer base of over 10 million people within a 200-mile radius in South Texas and northern Mexico. La Plaza Mall in McAllen boasts average sales of over \$500 per square foot.

The Mexican border city of Reynosa, just south of McAllen and Hidalgo, is home to a number of manufacturing plants. Black and Decker, one of the more prominent maquilas in Reynosa, also has a logistics center in the McAllen Foreign Trade Zone.

A boon for U.S. border cities

While some may say that free trade agreements and foreign investment in Mexico provide no benefit for Americans, many U.S. cities on the southern border would argue otherwise. Transportation, warehousing and other logistics businesses, retail and manufacturing employment all have increased significantly along the southern border in the last decade. ★★★

Founded in 1986, the Border Trade Alliance (BTA) is a grassroots, non-profit advocacy organization that addresses key issues affecting trade and economic development in North America. Working with entities in Canada, Mexico and the United States, the BTA advocates on behalf of policies and initiatives designed to improve border affairs and trade relations among the three nations.

¹ Laredo Development Foundation

³ Matt Rosenberg, "Maquiladoras in Mexico," About.com

⁴ Federal Reserve Bank of Dallas

⁵ Otay Mesa Chamber of Commerce

A Sea Change in Ocean Shipping

By Luke Rich The year is 2008 and the newest and largest container ship on the seas - with more than 10,000 fully loaded containers, their goods to be delivered to the Midwest and Eastern Seaboard of the United States – is setting sail from China. Which way does it go?

Across the Pacific to the U.S. and Canadian West Coast ports, or through the Panama Canal to U.S. East Coast ports, or around India and through the Suez Canal, the Mediterranean and across the Atlantic to Halifax and New York?

In 2006, there are three choices, the most likely being a U.S. or Canadian West Coast port. However, they are overcrowded, so maybe the route chosen is through the Panama Canal. The last choice for today's container ship would likely be the long trip through the Suez and across the Atlantic. In 2008, however, the Suez route may be the only choice.

What is happening to ocean shipping and why? What are the implications for existing U.S. logistics hubs, and the opportunities for other communities to capture a business they have not pursued in the past?

To borrow a phrase from Thomas Freidman's book The Earth is Flat, there is a triple convergence happening. This article explores the trends and some of the implications of this momentous shift in global logistics for communities in the United States.1

An explosion in world trade

Most experts agree that containerized cargo volume will nearly triple over the next 20 years. As more of the goods bought in developed nations are made in developing nations, the need to get them to market will grow rapidly. The vast majority of that growth will originate in Asia. About 4 million TEUs (twenty-foot equivalent units, the standard used

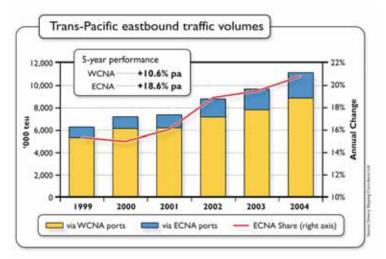


for container measurement) are to be shipped this year from Shanghai's brand new satellite container terminal at Yangshan. Within 10 years it will be 10 million TEUs. That figure takes into account the fact that some of the volume will move to places like Vietnam and Bangladesh as China's east coast becomes a more expensive place to manufacture.

Another factor contributing to the growth in shipping volume is the movement of manufacturing to Asia from Mexico, Central and South America, North American companies that once sourced low-end consumer goods in those countries are now purchasing those goods from the Far East. While the disruption in manufacturing employment in Mexico and Central America is a challenge for those nations, Mexico, at least, is looking toward distribution as a possible mitigation of this trend – but more on that later.

Moving that freight

The current fleet of container ships has taken 30 years to be produced. Industry estimates, based on orders placed and construction commenced, are that container shipping capac-



WCNA = West Coast North America

ECNA = East Coast North America

ity will increase by 50 percent in the next five years. The ships being constructed today are capable of carrying 8,000 to 10,000 TEUs and those on the drawing boards will carry up to 15,000 TEUs.

The vast majority of those ships will be too big to fit through the Panama Canal, as it can only accommodate vessels with about 3,600-TEU capacity. Even if TEUs were simply placed on a greater number of smaller ships, the Panama Canal could handle only a few more of them, as it is currently at 93 percent capacity. But why would Asian shippers not use the traditional West Coast ports of the U.S. and Canada?

Since the disastrous congestion experienced in 2004, West Coast ports have moved rapidly to address the problems. The improvements they instituted should keep congestion at bay for a few years, but "the question is not if, but when, the system becomes congested," Doug Tilden, President of Marine Terminal Corp., told the Journal of Commerce's Trans-Pacific Maritime conference in July of 2005. The big productivity gains achieved after 2004 have been effective; however, future gains for existing ports will be incremental. According to Tilden, the improvements that can be gained at existing ports will not be able to keep pace with the annual 4 millionper-year increase in volume of containers being added to the current annual volume of 44 million TEUs.

In addition to tight capacity, the ability of ports to handle the ships that carry those containers is limited as well. The 8,000-TEU container ships now plying the Pacific ride so deep fully laden that they cannot fit into some West Coast ports, putting increasing strain on the ports that can handle them. Furthermore, it takes up to three days to unload these ships using the fastest of cranes, which adds to wait times that now reach 14 days. Counting salaries and fuel, a ship at anchor in port costs its owners about \$300,000 a week just to wait.

Big changes are underway in the West. Most experts say it will help, but not be the sole solution.

"Atlantica" and Northeastern U.S. port opportunity

Bigger "post-Panamax" ships (ships larger than the Panama Canal can handle), crowded West Coast ports and fast-growing container shipment business all spell opportunity for Northeastern ports and their inland port cities. Because of the shape of the earth, a ship entering the Atlantic from the Straits of Gibraltar first travels north, then west across the North Atlantic to reach the Port of New York and New Jersey.

The region dubbed "Atlantica" by the staff of the Atlantic Institute for Market Studies includes New England, the maritime provinces of Canada and Quebec. Sixty-five percent of the population of North America lives within a one-day drive of this region, and the Port of New York and New Jersey is the major stop for container ships plying the Atlantic.

However, New York's port is overcrowded and currently unable to handle the depth of the fully laden post-Panamax container ship. Between the U.S. government and the Port Authority, a major dredging and blasting project is underway to deepen the shipping lanes to the container port. However, when this is complete it will still be difficult to accommodate the very largest 12,000-TEU ships. Enter the Port of Halifax, Nova Scotia, a two-hour steam off the route to New York.

With plenty of depth in the natural channel, good rail links with Toronto and Montreal, a good hub for "short sea shipping," and a location one sail-day closer to Northern Europe than any other North American port, Halifax is in a good position to capitalize on the trends taking place in global trade. (Short sea shipping uses inland and coastal waterways to move freight from major domestic ports to its destination.)

A ship from Asia using the Suez Canal could stop in Halifax to lighten the load, allowing it to enter New York Harbor to complete its unloading. Or that same ship could unload its entire shipment of containers to smaller ships that can ply the Great Lakes and shallower ports along the East Coast. This short sea shipping service is not yet operating



Because 60 percent of containers have contents destined for more than one customer, the opportunities for final assembly, warehousing and distribution jobs in places like **Buffalo** are attracting the attention of developers.

extensively, but the prospect of new mega-ships makes it a viable option. Conceptually, it is like a 747 flying between major international capitals where passengers disembark to take smaller planes to regional destinations.

In response to the increases in traffic in New York harbor, the Port Authority is not only deepening the sea lanes but increasing the capacity of the port to handle container traffic. This presents a land-based challenge to the Port, as it is very difficult to increase land holdings in this major metropolitan area. Thus, the Authority is trying to establish a series of inland ports.

The idea is to unload the containers to rail cars and barges and ship them to intermodal facilities inland where customs inspection, transfer of containers to trucks, and breakdown of containers with more than one customer's products can take place. A pilot program is operating up the Hudson River by barge to Albany, New York, and agreement has been reached with CSX Railroad to establish an inland port in Buffalo. Other such facilities in Pittsburgh and Harrisburg, Pennsylvania, are under consideration.

Because 60 percent of containers have contents destined for more than one customer, the opportunities for final assembly, warehousing and distribution jobs in places like Buffalo are attracting the attention of developers. In addition, the increased volume from Halifax and even Vancouver and Prince Rupert, British Columbia, present an intriguing opportunity for Buffalo.

The rail yards in Toronto are as hemmed in by development as the Port of New York and New Jersey. It has been reported that it can take up to three days to unload a container from the train to a truck in the Canadian National Railway (CN) yards. A high proportion of the goods entering Halifax are destined ultimately for the U.S., and the trip from Buffalo to Toronto is only about two hours by truck. Economic development and community officials in Buffalo are promoting the idea of establishing an intermodal transfer yard to serve the four railroads that enter their market (CN, CSX, Norfolk Southern and Canadian Pacific). Cargo from containers destined for the U.S. would go on from Buffalo



and Canadian goods would make the two-hour trip to the Toronto metro area or other destinations in Canada.

This vision is not Buffalo's alone. Memphis, Tennessee, Columbus, Ohio, and other cites in the east central U.S. are developing such facilities today to capture a portion of these new trends in global trade. Those cities, being further south, are seeking to be inland ports for the growing volume of containers coming into the ports of Norfolk, Virginia, and Charleston, South Carolina. Both of these cities are spending millions to accommodate the increase in volume coming through the Panama Canal, and to be able to unload the mega-ships that use the Suez route to bring cargo to the south central United States.

While all this is going on, the West Coast is not sitting idle.

Port capacity in Mexico and Canada

Mexico is not sitting and watching the slow erosion of its manufacturing base. In fact, it is working with the U.S. companies that have shifted some of their manufacturing capacity to Asia to retain the final assembly and higher-skill pro-



This explosion of world trade presents opportunities and challenges for communities not just along the coast of North America but far inland as well.

> duction in Mexico. They also are spending millions of dollars creating new port facilities to capture the shipping that cannot be accommodated by the existing West Coast ports in the U.S. and Canada.

The existing port of Lazaro Cardenas now handles 180,000 cargo containers per year. Current expansion efforts will increase that capacity to 2 million containers per year within five years. The port will expand its land holdings ten fold, its berthing spaces by a factor of three and will dredge the harbor to a 50-foot depth.

Then there is the multi-billion-dollar plan to remake Punta Colonet, a remote bay 140 miles from the U.S. border, into a mega-port. The terminal complex will feature a network of warehouses, distribution centers and berths capable of handling the largest container ships, all of which will be connected to California by a dedicated rail line. The plan is to be handling one million TEUs by 2012.

What a boon for Kansas City! Kansas City? Yes, Kansas City. Industry experts say that 50 to 60 percent of the containerized imports that come into ports on the West Coast end up on the other side of the United States. That is why Kansas City, 1,300 miles from the Pacific Ocean, is looking to become the destination and distribution center for Asian cargo.

Kansas City's quest to become an inland port began in the 1990s as municipal leaders looked to take advantage of the city's historic role as a major transportation hub. It is the second largest rail center in the U.S., and customs agents already clear more than \$9 billion in imports a year moving through the city.

In March 2005, Kansas City signed a cooperative pact with representatives from the Mexican state of Michoacan and Lazaro Cardenas to increase cargo volume between the two cities. Now that Mexico has substantially reduced its customs charges for containers moving through Mexican territory, containers unloading in Lazaro Cardenas are up to 15 percent cheaper to unload than those moving through Long Beach or Los Angeles.

Far to the north, the Canadian and British Columbia governments, Canadian National Railway and Maher Terminals of Canada Corp. are cooperating in the creation of a vastly expanded container port in Prince Rupert, well up the coast of British Columbia.

This \$300 million investment will handle over 500,000 TEUs when complete in 2007, with expansion capacity to over 2 million TEUs. The facilities will be able to accommodate the very largest post-Panamax ships. Specially built cranes and infrastructure have been designed to move the containers to CN trains that then will deliver the goods to Chicago, Memphis and Toronto.

"If the projects planned for Mexico, the U.S. and Canada (on the West Coast) are all available over the next three years, they will barely handle the three years of growth that will occur," concluded Doug Tilden at the 2005 Journal of Commerce Conference in Long Beach. This explosion of world trade presents opportunities and challenges for communities not just along the coast of North America but far inland as well. Those that react quickly to this sea change in global shipment will prosper. ★★★

Luke Rich is Chairman of Asian Development Group Corporation, a consortium of financial, development and public relations firms formed to conduct business in Asia.

¹ Much of the data and concepts laid out in this article are based on the excellent research and publications advanced by the Atlantic Institute for Market Studies (AIMS), a Halifax, Nova Scotia-based think tank led by Dr. Brian Lee Crowley.

Intermodal Opportunities in Appalachia

By The Appalachian Regional Commission Today, freight movement is undergoing revolutionary changes. Increased

containerization of goods, combined with unprecedented advances in logistics technology, has made both intermodalism and multimodalism

the new global standards in freight transportation. Because of this, adequate highways alone are no longer sufficient to serve the transportation needs of the new economy.

Without question, a region's competitive position will depend on access to efficient, seamless intermodal transportation that features interconnected highway, rail, air and marine transportation capabilities. Because of its geographic position, Appalachia serves as a crucial "land bridge" for both north-south and east-west commerce. Its role in bridging the nation's heartland to key international gateways positions the region to reap economic development benefits by improving transportation efficiency, expanding capacity, and taking advantage of strategic intermodal opportunities.

Historically, transportation investments have been valued based on efficiency gains such as travel cost and time savings. Recently, however, there has been a push to promote transportation infrastructure improvements to enhance economic development in terms of jobs, income, and tax base expansion. This is especially crucial in an economically distressed region like Appalachia.

The recent surge in the recognition of transportation infrastructure as an economic development tool is not a rebirth of the "build and they will come" theory that led to many misaligned investments in the past. Instead, this shift is in response to input provided by potential developers and industry experts. The underlying concept is that a lack of transportation alternatives can retard economic development potential, as commerce tends to flow to those regions offering the broadest and most cost-efficient options. For example, Appalachia stands to reap substantial economic gains from the increase in foreign trade, especially with Latin



America. However, failure to invest in the transportation infrastructure necessary to maintain the region's competitive stance and its ability to connect with the global supply chain will result in lost economic and employment opportunities.

As the economy of Appalachia continues to evolve, it will be essential to attract the industries of the "new economy." The region is already experiencing the dislocation of key furniture and automotive supplier industries. As a result, many states in the region are turning their recruitment efforts to new industry clusters, including logistics and distribution services and high-tech manufacturing. The transportation requirements of these industries go well beyond the need for highways. The industries of the 21st century will require seamless intermodal connectivity with frequent and reliable deliveries. The attraction of these new industrial clusters will hinge on the region's ability to meet their demanding and diverse transportation needs.

Intermodal transportation and opportunities

Technically, "intermodal" transportation refers to any service where two or more modes are combined to facilitate a single movement of either freight or passengers. In this article, "intermodal" refers to the coordinated, multi-modal move-

Inland ports provide short-haul rail movement to shuttle containers away from crowded port facilities to less congested inland sites for processing and transfer to other rail and truck services.

ment of truck trailers or shipping containers over the region's highway, rail, and waterway systems. From this point of view, the region of the Appalachian Regional Commission (ARC) suffers from very limited intermodal capabilities, resulting in increased transportation costs and a loss of competitive edge for the region's business interests.

Intermodal rail

There are two principal reasons for the relative paucity of truck/railway intermodal combinations within the region. First, overall traffic volumes outside of urban areas have been modest, which has hindered the development of intermodal trans-load facilities. Second, many of the region's urban centers, such as Pittsburgh, Knoxville, Chattanooga and Birmingham, historically have relied on trucking to move containers to and from major Atlantic and Gulf ports due to cost and reliability advantages. However, as highways become increasingly congested and as operational issues such as driver shortages, insurance and fuel costs combine to drive up trucking costs, the economic attractiveness of the region's rail services is expected to grow.

Inland ports and potential new facilities

The use of containers in international traffic has generated tremendous growth in container movement through U.S. ports. Indeed, the Association of American Railroads estimates that total railroad container traffic has grown at an average rate of 8.6 percent per year between 1988 and 2000, with most of this growth attributable to international traffic. Reflecting this transition, intermodal transport has now surpassed coal as the largest single revenue source for America's railroad industry, demonstrating how rail is becoming an increasingly important link within the global supply chain.

Appalachia can play a strategic role in getting goods between key ocean ports, including New York/New Jersey, Norfolk, Charleston, Savannah, Gulfport and Mobile, and the nation's Midwest and southeastern regions. One way of strengthening the land-bridge concept is through inland ports. Inland ports provide short-haul rail movement to shuttle containers away from crowded port facilities to less congested inland sites for processing and transfer to other rail and truck services.

The Virginia Port Authority has already developed the successful Virginia Inland Port (VIP) at Front Royal as an inland satellite to its traditional ocean port facilities in the Norfolk/Newport News area. In addition to the VIP, Huntsville (Alabama) International Airport's International Intermodal Center also demonstrates how a fully coordinated intermodal center can attract significant economic and employment success. Elsewhere, South Carolina is exploring the potential of establishing inland ports linked to the marine terminals of the Port of Charleston.

As the inland port at Front Royal demonstrates, it is not necessary that such facilities be located in urban areas with large populations. In fact, rural locations may offer important advantages. First, the lack of local roadway congestion reduces overall transportation times and costs. In addition,





cost-attractive land is often available, making initial construction and future expansion highly attractive. While these inland ports improve transportation efficiencies, they also serve as economic magnets, drawing commerce to the surrounding region.

Finally, another approach to inland port centers demonstrates how global air cargo can be integrated with other, more traditional modes. One of the nation's best examples of this concept is located at Huntsville International Airport. This mixed-use complex comprises Huntsville International Airport (HSV), the International Intermodal Center (IIC), and Jetplex Industrial Park. Huntsville International Airport, in conjunction with the IIC, provides the Port of Huntsville with comprehensive aviation, rail, highway and sea intermodal connectivity, including key ocean port links to and from Gulf, Atlantic, and Pacific coasts. The Port of Huntsville offers an excellent example of how the ARC region can diversify and strengthen its economic base through improved links with the global logistics network.

Container-on-Barge (COB)

Should container-on-barge service emerge along the region's inland waterway system, the Appalachian highway system can serve as an important connection to new intermodal truck/barge terminals.

Two important factors may contribute to the future commercial viability of limited container-on-barge operations. First, as noted, increased globalization is taxing the nation's ability to handle container traffic over existing ports. This may result in the use of barges for shuttle movements to inland ports - much as is being done between the Port of New York/New Jersey and its satellite port at Albany, New York. Second, increased globalization is leading to the use of container shipping for lower-value commodities that are not as time-sensitive as more highly valued goods. Thus, it may be possible to use barge transport in more extensive movements of containers carrying less valuable commodities.

Efforts to launch these new intermodal services are already

underway in Pittsburgh, Pennsylvania and at several other locations within the ARC region. As with rail and inland port facilities, the highway system is essential in linking these emerging intermodal centers to and from the region's businesses.

Strategic intermodal opportunities in the ARC region

The geographic location of the ARC region, combined with the continued densification of both north-south and east-west trade lanes, positions the region to become a land bridge by providing intermodal freight movements into the nation's hinterlands. Commodity flow analysis and forecasts, combined with an inventory of the region's existing intermodal facilities, have revealed numerous intermodal opportunities. Ranging from full implementation to early conceptual stages, the seven examples below all are

designed to create important new transportation and economic development benefits. While they do not represent all of the intermodal possibilities in the region, they are meant to serve as a cross-section of transportationrelated investments.

- Trans-Tennessee Railroad: The Trans-Tennessee Railroad calls for the completion of a freight rail corridor connecting Knoxville to Memphis via Nashville. The plan essentially would create a direct rail corridor between the three cities that roughly parallels I-40 through the center of the state.
- Central Corridor Doublestack Initiative (Heartland Corridor): Creating doublestack capability along the Norfolk Southern (NS) route through the heart of the Appalachian region (connecting the region to Columbus, Ohio and Norfolk, Virginia) will require a substantial investment to the railroad's infrastructure. Such an investment would strengthen the region's transportation infrastructure and better connect area businesses to the global marketplace.
- Virginia Inland Port: The objective of an inland port is twofold: alleviate container and associated traffic congestion around a given seaport and move transportation and distribution infrastructure closer to inland commerce. This concept has been successfully put into practice at the 161-acre Virginia Inland Port, located 70 miles west of Washington, D.C., in Front Royal, Virginia. The VIP effectively brings the Port of Norfolk, Newport News and Hampton Roads 220 miles inland, to the doorstep of Appalachia.
- South Carolina Inland Port: The primary objective of a South Carolina Inland Port (SCIP) would be to alleviate congestion at the Port of Charleston and to assist in accommodating future volume growth. As the Port of Charleston has developed, issues regarding traffic congestion and safety, port expansion, compatible land-use and environmental impact have clouded the Port's growth potential.



- Port of Huntsville: The Port of Huntsville, as noted above, is an inland port comprised of Huntsville International Airport (HSV), the International Intermodal Center (IIC) and Jetplex Industrial Park. Huntsville International Airport, in conjunction with the IIC, provides the Appalachian Region with air, rail, road and sea connections to the rest of the world.
- Port of Pittsburgh, Container-on-Barge: The Port of Pittsburgh container-on-barge (COB) inland waterway network embraces the concept of containerized transport of commodities (that traditionally move via road or rail) via flat-deck barge. Currently, commodities transported by barge tend to be low-value bulk goods. However, the use of container barges, capable of carrying large numbers of containers and being loaded and unloaded quickly at port, has the potential to change the dynamics of barge transport and bring competitive advantages to area businesses.
- Erie Cross-Lake Ferry: The Erie-to-Nanticoke Freight Ferry will provide scheduled, containerized waterborne freight service between the Port of Erie in northern Pennsylvania and Nanticoke in southern Ontario, Canada. The concept is designed to take advantage of increasing trade and associated commodity flow between Canada and the United States and establish Erie as a new gateway of international trade.

In communities such as Huntsville and Front Royal, we have witnessed how carefully planned, proactive investments in transportation infrastructure can enhance the capacity, efficiency and responsiveness of the region's transportation network, while at the same time helping to retain existing businesses and attract new enterprise into the region.

Conclusions and recommendations

The following set of conclusions and recommendations can help Appalachia position itself for success in the 21st century. The recommendations are intermodal by design and call for establishing a closer and more integrated relationship between the region's transportation and economic development interests.

- · Search out and identify institutional mechanisms to more effectively design, build and operate regional transport initiatives that extend across traditional jurisdictional boundaries.
- · Intensify the interaction and cooperation between economic development and transportation interests.
- Facilitate expanded public/private partnerships and focus on opportunities to better achieve the full economic potential of transportation investments.
- · Optimize the capacity, efficiency and responsiveness of the region's transportation resources and actively apply these assets to attract new commercial and employment opportunities into Appalachia.
- · Continually track economic and commodity flow trends to anticipate and position for change.
- · Establish a region-wide process to identify and develop



improved intermodal links between the Appalachian highway system and Appalachia's rail, water, and aviation modes.

- Seek out opportunities to better use advanced information, communication and security technology to rethink the region's transportation efficiency and enhance its potential to attract new commercial and employment opportunities into Appalachia.
- Develop a collaborative approach to more actively advocate for the region's individual and collective transportation resources, so as to assure that Appalachia will have full access to opportunity in the 21st century.

Appalachia has experienced the stark economic and human consequences of isolation. As the region moves into a new century, the freedom of access that its transportation system will provide will be critical to its businesses, communities and people. In the 21st century, the globalization of trade and the desire to broaden and diversify the region's economic base will demand fast, diverse and efficient access to opportunity. ★★★

This article is excerpted from a report prepared for the Appalachian Regional Commission by Rahall Transportation Institute, Marshall University, and Wilbur Smith Associates. The full report can be accessed on the Web at http://www.arc.gov/images/reports/interopp/intermodalopp2.pdf.

America's Dependence on Flight-by-Night Operators:

The Underappreciated Role of Air Cargo in the U.S. Economy

By Jock O'Connell Many years ago when I was growing up in Maine, it was alleged that some of the state's more mischievous rus-

tics would occasionally humor themselves at the expense of tourists. Thus, a wayward traveler befuddled by meandering back roads might be advised to "drive straight on until you come to where Tucker Drummond's barn used to be."

More famously, an unfortunate traveler asking the way from, say, Meddybemps to Millinocket, might simply be told that "you can't get they-ah from hee-ah."

If tourists are not likely to rejoice in the news that "there" is unreachable from "here," imagine the exasperation of business people, civic leaders and economic development officials when that judgment is applied to their city or region.

For in today's global economy – with its burgeoning overseas markets, far-flung supply chains, lean inventories and just-in-time delivery schedules - efficient and reliable transportation links to the rest of the world have become indispensable assets to any community aspiring to remain economically competitive.

Yet seldom has the nature of those links been less well understood or appreciated.

Consider recent developments in California, where Republican Governor Arnold Schwarzenegger and the state legislature's Democratic leadership are seeking to negotiate a massive infrastructure bond measure that would, among other things, earmark over \$20 billion to boost the carrying capacity of the state's "global gateways," the complex system of highways and railroads linking the ports of Los Angeles, Long Beach and Oakland with the rest of the country.



Last year, these three seaports handled more than 41 percent of all container traffic entering the U.S. With that volume of trade expected to double or even triple over the next twenty years, a huge investment in the state's maritime-related infrastructure would seem to be a classic no-brainer.

But what about exports?

There is one small problem, however. While there is an unquestionable need to facilitate the flow of cargo through the state's seaports, the goods movement strategy now being considered at the state capitol inexplicably ignores the mode of transport used to carry most of California \$120 billion export trade.

For, surprising as it may seem, most of California's merchandise exports go nowhere near any of the state's huge seaports. Instead, like the vast majority of vacation travelers and

The idea that worldwide, some 40 percent of the value of internationally traded goods these days is shipped by air is usually greeted with amazement, if not utter disbelief.

businesspeople journeying abroad, they go by plane. In fact, more of California's merchandise export trade moves by air than by sea and land combined.

That's right. Last year, California's airborne exports – flown either aboard air freighters or in the cargo holds of passenger aircraft – amounted to \$62 billion, or 53 percent of the state's entire \$117 billion export trade. Another 26 percent went overland to Canada and Mexico. Barely one-fifth of the state's exports passed through those seaports on which so much policymaker attention is being lavished.

And 2005 was no anomaly. Ever since reliable state-oforigin export statistics first became available nearly twenty years ago, trade analysts have known that the majority of California's exports have been airborne.

In this respect, California is far from unique. According to the U.S. Census Bureau's Foreign Trade Division, eleven additional states - Arizona, Colorado, Connecticut, Idaho, Massachusetts, Minnesota, New Hampshire, New Mexico, Nevada, New York and Utah - saw over half of their merchandise exports leave by plane in 2005. Nationally, fully 33 percent of America's \$893 billion merchandise export trade last year was transported by air, while ships carried away about 29 percent of our exports.

Yet for most Americans – including many policymakers – international trade is closely associated with the waterfront. While a misconception, it is perhaps an understandable one. After all, few newspaper articles or television news reports about foreign trade neglect to feature at least one iconic image of towering cranes lifting steel shipping containers off of behemoth ships. And while our popular culture is strewn with sea-faring tales and waterfront dramas, only one Hollywood film involving an air cargo flight - "Cast Away," starring Tom Hanks - comes to mind.

If anything, airports are widely regarded as joyless purgatories where passengers are obliged to endure serial indignities with some hope of eventually arriving at the same destination as their luggage. Scarcely anyone associates airports with freight shipments. Mail, definitely; express packages, sure; but the idea that worldwide, some 40 percent of the value of internationally traded goods these days is shipped by air is usually greeted with amazement, if not utter disbelief.

It is peculiar, though, that this news should surprise any-

one. Items shipped by air typically have high value-to-weight ratios, a characteristic that encompasses much of what is produced by sophisticated, advanced technology industries. Electronics components, pharmaceuticals, medical equipment, a wide range of time-sensitive goods as well as documents vital to the legal and financial professions are routinely shipped by air. Even food products, including Maine lobsters, Chesapeake Bay clams and Washington State cherries take flights. California's airborne agricultural export trade alone exceeds \$600 million per year.

Moreover, the ability to transport goods by air is particularly critical in times of emergency. While this is most obviously true in the case of relief supplies for disaster victims, airborne shipments are frequently used to fix supply chain snafus. In the fall of 2002, for example, when docks along the West Coast were closed for several days due to labor strife, numerous companies such as Dell Computer and Toyota chartered air freighters to keep their U.S. assembly lines running.

Air transport industry forecasts uniformly predict healthy increases in air cargo volumes over the next two decades. But whether America's air cargo infrastructure will be able to meet this rising demand is another question altogether.

Restrictions to growth

The policymaking myopia that causes elected officials to instinctively think of foreign trade as primarily a maritime activity is likely to have some not-so-trivial consequences. Just as the nation's seaports need to prepare for a doubling or tripling of trade volumes over the next two decades, so too do the nation's airports.

Regrettably, like much of the rest of America's transportation infrastructure, most U.S. airports are legacies of a much different era. With few exceptions, nearly all of the country's major airports - from Boston's Logan to San Diego's Lindbergh – were built decades ago on sites that have long since been enveloped by the sprawl of industry and housing. Even worse, their runways and other facilities were laid out long before anyone could anticipate not just the explosion of passenger air travel, but the impact that e-commerce, global supply chains and just-in-time delivery would have on the air transport industry. In short, virtually all of the country's

Value of U.S. International Merchandise Trade by Mode of Transportation: 2004

(Millions of current U.S. dollars)

Exports

MODE	EXPORTS	MODAL %
Water	233,639	28.6
Air	270,041	33.0
Truck	215,247	26.3
Rail	30,229	3.7
Pipeline	1,671	0.2
Other, unknown, & miscellaneous	67,109	8.2

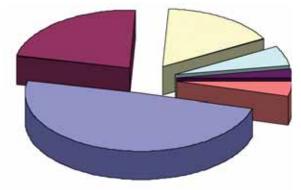
Source: Bureau of Transportation Statistics.

older airports are either at or close to capacity, with little or no room to expand.

To make matters worse, decades of short-sighted land-use policies have created vocal anti-airport constituencies. Efforts to increase airport operations almost anywhere in the land, especially if air cargo flights are involved, invariably encounter intense local opposition. Air freight operations have been especially sensitive since they tend to be relegated to late evening or early morning hours when passenger flight traffic is minimal. For all intents and purposes, Federal Express and UPS, which have come to dominate the U.S. air cargo market in the last decade, are literally fly-by-night operators.

So it is understandable that those who live within the sound contours of airports can become upset whenever plans are announced to increase the frequency of nocturnal flights. They and others are likewise apt to lobby against any increases in airport operations, arguing that the result will be more surface traffic and more air pollution to neighboring communities. To placate local critics, airport authorities have frequently been forced to curtail times of operation and require departing and arriving aircraft to follow strict noise-abatement measures. Even so, airports across the nation have been obliged to spend hundreds of millions of dollars to soundinsulate nearby homes or buy them outright for demolition.

Imports



MODE	IMPORTS	MODAL %
Water	724,946	49.3
Air	329,387	22.4
Truck	237,706	16.2
Rail	78,131	5.3
Pipeline	36,829	2.5
Other, unknown, & miscellaneous	62,672	4.3

The conflicts airports everywhere have with neighboring communities are unfortunate because airports can be important catalysts for regional economic growth. Just as cities once prospered by virtue of their location on important waterways or overland trade routes, it is difficult to conceive of a modern metropolis that can flourish without efficient air links to transport people and goods around the world. Certainly, communities eager to forge a strong economic

It is difficult to conceive of a modern metropolis that can flourish without efficient air links to transport people and goods around the world.



base featuring highly competitive companies have a special need for airports able to provide extensive cargo services.

Job generators, transportation hubs

The particular significance of air transport to the technology sector and to the maintenance of agile manufacturing processes and supply chains is reflected in the research of Kenneth Button and Roger Stough of the Institute of Public Policy at Virginia's George Mason University. They have found that, on average, metropolitan regions with airport hubs featuring air cargo operations generate significantly more high-tech jobs than regions without hubs. After looking at over 300 American cities, Button and Stough concluded that the presence of a hub airport accounted for almost two-thirds of the variation in high-tech employment levels.

Ultimately, airports will likely develop into transportation hubs. Probably no one harbors a more audacious vision of the future role of airports as economic catalysts than John Kasarda, director of the Kenan Institute of Private Enterprise at the University of North Carolina-Chapel Hill. His belief is not simply that airports will shape business location and urban development in the 21st century much as paved roads and ultimately the interstate highway system did in the 20th century, railroads in the 19th, and river and seaports well before then. Kasarda has coined a new term, "aerotropolis," to describe his notion of extensive mixed-use developments combining office, retail and entertainment facilities designed and built around airports. For air cargo-dependent companies that have seen their time-sensitive shipments miss scheduled flights because of hopelessly congested highway traffic, the appeal of locating close by a suitable airport can be very persuasive.

The next few years offer some intriguing prospects for scores of U.S. airports that have thus far been left out of the loop internationally. On the diplomatic front, there has been growing enthusiasm for dispensing with the old regime of bilateral air treaties. A typical bilateral accord spells out exactly which national airlines could serve which city-pairs with how many flights per week. In recent months, however, there has been appreciable progress in negotiating the terms

of a comprehensive new treaty between the U.S. and the 25-member European Union. That treaty would take significant steps toward a system in which market forces would essentially determine trans-Atlantic air service.

What makes this diplomatic development especially opportune is the near simultaneous advent of a new generation of jet aircraft in the form of the Boeing 787 and, in time, its Airbus competitor, the A350.

The 787, nicknamed the Dreamliner, is slated to enter commercial use in 2008. A mid-sized aircraft, it stands – or perhaps more accurately, flies - in stark contrast to the fabled Airbus 380, the super jumbo that will carry perhaps as many as 900 passengers between a handful of major world airports. Indeed, the 787 was specifically designed

to offer airlines an option to the hub-and-spoke system that has come to dominate air routes. With its exceptional range and fuel economy, the 787 – depending on configuration – will permit the world's airlines to fly 225 to 325 passengers non-stop between widely separated, non-hub airports. (Since May 2004, Boeing has booked nearly 300 orders for the 787, a record for any plane not yet in service.)

Equally important, the 787 and the Airbus 350 will eventually provide businesses throughout the U.S. with entirely new pathways to global markets as more and more American airports see the inauguration of international flights.

That's important. For in today's global economy, anyone building a better mousetrap will not find the world beating a path to his or her door unless there happens to be either a deep-water port or a runway two miles long in the front yard. Local economic development officials eager to attract not to mention retain – globally competitive companies would do well to start fretting about their region's air-transport capacity and whether state and local officials are sufficiently aware of just how vital airports and air cargo operations can be to a region's economic prospects. Absent such awareness - indeed, absent a constituency to push back against local opposition to airport development and/or expansion projects – those prospects will almost predictably grow dim. ★★★

Jock O'Connell is a Sacramento-based international economic and logistics consultant and a member of the California Economic Strategy Panel's Technical Advisory Group. More information is available at his Web site, www.jockoconnell.com.

Making Charlotte an **International City**

Executive Director, The Mayor's International Cabinet

By Lorne E. Lassiter In 1992, Charlotte, North Carolina – with a foreignborn population of roughly 2 percent, 325 foreignowned firms and two honorary consuls - would not

have been considered an international city by most. However, Charlotte did have an international vision for the 21st century. The task force charged with articulating this vision wrote:

"As international trade expands and advances in technology bring the peoples of the world closer together, cities are taking on new roles in the global arena. Charlotte welcomes these changes and is committed to strengthening its international position. As it enters the 21st century, Charlotte is committed to developing:

- An informed citizenry that is part of the global community;
- Civic leaders committed to enhancing Charlotte's role as an international city;
- · An active business community committed to integrating the region's industry, financial, and commercial institutions into the world economy;
- A hospitable environment that promotes an international perspective, international opportunities for students and citizens; and
- A wide range of financial, commercial, educational, cultural and global linkages that integrate the city into the world economy."

Out of this vision, the Mayor's International Cabinet was formed and initially charged with being the principal advisor to then-mayor Richard Vinroot about international affairs.

Yet even in 1992, no one anticipated the rapid changes that have dramatically altered the landscape, demographics and culture of Charlotte. Fourteen years later, Charlotte/ Mecklenburg County, now the second largest banking center in the U.S., has a population of 850,000, over 12 percent of whom are foreign-born. According to the Pew Hispanic Center, Mecklenburg County's employed Latino population increased from 3,500 in 1990 to 23,024 in 2000, a growth rate of 556 percent.1 Our Asian population is estimated as high as



Charlotte Mayor Pat McCrory hosts the Mayor's International Community Awards, an annual event honoring the corporate philanthropy of Charlotte's foreign-owned firms.

50,000, and we are welcoming daily new populations of Bosnians, Somalis, Ivorians, Cambodians and Salvadorians, among many others.

In 2006, Charlotte/Mecklenburg has 654 foreign-owned firms representing 37 countries and providing over 25,000 jobs. German-owned firms currently are the largest group, with Canadian representation rapidly increasing. Our honorary consular corps has recently added its ninth member, a representative of Canada. Due to workload, for the first time in history the U.S. government has approved the addition of an Honorary Vice-Consul position for our busy Honorary Mexican Consulate.

While staying focused on the vision of developing and strengthening Charlotte's international position, The Mayor's International Cabinet (MIC) has also responded and adapted. As our new tag line says, the Cabinet currently serves as the "region's leading resource for promoting international business and international communities." The Cabinet is uniquely positioned to be both the liaison and catalyst for a forward-thinking approach to helping Charlotte deal with the issues and opportunities that arise from rapid international growth.

Survey data indicate that there are 6,767 immigrantowned firms in the Charlotte area employing 14,419 people, with total payroll of \$667 million.

Economic impact

The economic impact of international growth on our region is reflected most directly by two kinds of businesses: firms that are foreign-owned and small business that are started by immigrant entrepreneurs. Foreign-owned firms contribute millions of dollars to the local economy by paying taxes and employing from the local market. They come to our region primarily as subsidiaries of German, Japanese or Canadian companies; as sales offices, such as Lufthansa airlines; or by buying local companies such as Freightliner and Food Lion. As this kind of foreign investment increases, these firms become important to the development of our community not just through the employment they create, but also by supporting local philanthropy and by encouraging their employees to volunteer in community initiatives.

The second kind of business – those owned by immigrant entrepreneurs – tends to be much smaller but is still important. That our new populations bring a strong work ethic and entrepreneurial spirit is demonstrated by the many family-owned small businesses – restaurants, meat markets, laundries, auto repair shops, nail salons - that have developed on our "international" corridors. Our research indicates that as many as 77 percent of small international businesses have been self-started, as opposed to having either been inherited or purchased.

As our region continues to attract new international residents, the Cabinet has realized that our solid economic data about these populations are deficient. Therefore, in 2005 we partnered with the University of North Carolina-Charlotte's Belk College of Business to develop and implement a study of immigrant entrepreneurship in Charlotte/Mecklenburg.

Because of cultural differences, these data are more difficult to obtain than are general small business survey results. However, in April 2006, the Belk College and MIC were able to present a preliminary analysis. The data indicate that there are 6,767 immigrant-owned firms in the Charlotte area employing 14,419 people, with total payroll of \$667 million. Even though the immigrant population is roughly 50 percent Hispanic and 25 percent Asian, we found that Asians account for 50 percent of the entrepreneurs while Hispanics account for 30 percent. The fact that Charlotte's Asian populations have been in the area much longer than the Hispanic populations may account for some of this difference.

Finally, the economic impact of our growing international population is reflected in the money these residents earn and spend locally. According to a 2002 study by the Mayor's

International Cabinet, The Economic Impact of the International Community in the Charlotte Area, the annual purchasing power of Hispanics and Asians in Charlotte/Mecklenburg was estimated to be more than \$311 million and \$353 million, respectively.

How the Cabinet works

The Mayor's International Cabinet is a 501(c)3 corporation as well as a financial partner with the city of Charlotte. We are a city committee, meaning that our 30 members are appointed by the mayor, the city council or the city manager. As such, we ensure that our efforts closely follow the goals they set for the city. We also align ourselves with the mission of the Economic Development Office of the City of Charlotte, whose director is an appointed member of the

In our early history, six issue groups were the basis of our committee structure and each had a chairman with an action plan. (Those groups included visibility and awareness; community services and welcome; cultural education; higher education and business; international business and economic development; and international organizations.) As the organization has matured, we have determined that rather than operating with a set committee structure, we can better meet the needs of international Charlotte by partnering with other organizations to do needs assessments and research and by focusing our efforts on being a catalyst.

The growth of our international populations has driven a corresponding growth in the number of cultural and social service organizations that work directly with these groups. As they have stepped forward to meet the needs initially identified by the committees, we support and promote their work to encourage collaboration and avoid duplicating efforts. For example, on an ongoing basis we track the growth of the international non-profit, educational, cultural and social service organizations in the area. We maintain this data in an on-line searchable database (www.charlottemic.org) and annually publish a brochure entitled *International Charlotte*. We swap our non-profit data with the Chamber for their data on foreign-owned firms, and the Chamber includes all of this information in its annual publication, International Review. Between 2005 and 2006, we saw an increase of 77 international non-profits in our area.

We also track all international events, seminars and meetings in the area and publish a weekly electronic newsletter, *International Focus*, to highlight and promote these events.

From these data, we publish a second annual brochure, International Festivals, dedicated to the large ethnic festivals and other international events on a month-by-month basis. Both of these brochures are included in the international recruiting packets of the Charlotte Chamber of Commerce and the Charlotte Regional Partnership.

The Cabinet also facilitates cooperation and collaboration among our international populations and businesses. For example, we are currently working with our diverse African populations to revitalize the African Chamber of Commerce and to have these representatives interact in a proactive way with our Ghanaian Sister City of Kumasi. Both the Asian and Latino business communities have formed successful chambers and are able to serve as mentors as the process moves forward. We support the various ethnic chambers in their projects and efforts and ensure through our MIC Envoy program that the Cabinet is represented at as many events, seminars and festivals as possible.

In the last year, we partnered with the city economic development office and Charlotte Sister Cities on the Mayor's International Business Breakfast for leaders of Charlotte/Mecklenburg's foreign-owned firms. We modeled this event on the very successful breakfast conversations that are sponsored by the Charlotte Chamber and offer an opportunity to dialogue with the mayor. As many of our international businesses are not accustomed to an informal conversation with a high-ranking city official, we are currently restructuring this event. Rather than inviting all 650plus firms to one breakfast, we will hold several smaller events where it is more comfortable for the attendees to interact with and express their concerns to the mayor.

The Cabinet does not do any direct programming on an ongoing basis with the exception of one big event, The Mayor's International Community Awards (MICA), each spring. The MICA event was begun in 1998 as a way to recognize the corporate philanthropy of our foreign-owned firms. It brings together international businesses, elected officials and local businesses that support international affairs and international business development. We obtain sponsorship from major companies and encourage these sponsors to use the event to sell our city as one receptive and welcoming to international business people.

Growing Diversity

The wise citizens who formed the Mayor's International Cabinet in 1992 gave us a strong vision of an international city and a solid framework from which to be a catalyst in the cooperative internationalization of our area. All indications are that strong international growth will continue for the near future in Charlotte/Mecklenburg, and the Mayor's International Cabinet will continue to be a partner in their integration into our culture and economy. $\star \star \star$

New Information Resources

"EDA's Regional Development Account: **Good News for Bural America**"

This new brochure outlines the benefits for America's rural communities of EDA's Regional Development Account (RDA), which has been proposed by President Bush in his 2007 EDA Budget Request to Congress. The RDA will help rural communities tap into resources that will strengthen their capacity for innovation and entrepreneurship within regional economic frameworks.

The brochure illustrates examples of leading regional competitiveness and cluster-based economic development initiatives, and contains "Frequently Asked Questions" on EDA's role in supporting rural communities.

To access the brochure on-line, visit EDA's Web site at www.eda.gov.

"Measuring Regional Innovation: A Guidebook for **Conducting Regional Innovation Assessments**"

The first step in building an innovation-based economic development strategy is assessing the regional innovation environment. This guidebook outlines a process for collecting data on key measures of innovation that can be used to drive regional economic development policies and programs.

The methods described in the guidebook are based in part on six regional projects, funded by EDA, which were part of the Council on Competitiveness's Regional Innovation Initiative in 2003-2005.

To access the guidebook on-line, visit www.compete.org/nri/regional innovation guide.asp.



¹The New Latino South: The Context and Consequences of Rapid Population Growth, July 2005.

About EDA Information Clearinghouse Partners

Part of the United States Department of Commerce, the mission of the **Economic Development Administration (EDA)** is to lead the federal economic development agenda by promoting innovation and competitiveness, preparing American regions for growth and success in the worldwide economy.

EDA was established to generate jobs, help retain existing jobs, and stimulate industrial and commercial growth in economically distressed areas of the United States.

EDA assistance is available to rural and urban areas of the nation experiencing high unemployment, low income, or other severe economic distress.

The International Economic Development Council (IEDC)

is the premiere organization for the economic development profession. Serving close to 4,000 members, IEDC is the world's largest professional membership organization providing a diversity of economic development services, including research and advisory serv-



ices, conferences, professional development and legislative tracking. Visit IEDC's website at www.iedconline.org to learn more about membership, upcoming events and IEDC services.

The **National Association of Regional Councils** (NARC) is the preeminent alliance for foster-

ing regional cooperation and building



regional communities. For more than three decades, NARC has represented multipurpose regional councils of government that assist community leaders and citizens in developing common strategies for addressing cross-cutting transportation, economic development, air and water quality, social equity, growth, and other challenges, through advocacy, training, technical assistance and research. For more information, visit www.narc.org.

For back issues of Economic Development America and to learn more about EDA's information resources, follow the "Information Clearinghouse" link at the bottom left of EDA's home page, www.eda.gov.

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